

AMENDMENT UNDER 37 C.F.R. § 1.114(c)
U.S. Appln. No.: 10/030,451

AMENDMENTS TO THE CLAIMS

This listing of claims will replace all prior versions and listings of claims in the application:

LISTING OF CLAIMS:

1. (currently amended): An apparatus for photocuring a coating on a target fiber, comprising:
 - a laser source;
 - a beam expander for expanding an output of the laser source;
 - a first lens operable to focus an output of the beam expander on the coating disposed on [[a]] the target fiber, wherein the coating is responsive to a wavelength of light emitted from the laser source; and
 - a concave optical element disposed on an opposite side of the target fiber relative to the beam expander and said first lens.
2. (original): The apparatus of claim 1, wherein said first lens comprises a plano-concave lens with a planar side disposed towards said beam expander.
3. (original): The apparatus of claim 1, wherein said laser source outputs radiation in a visible light range.
4. (original): The apparatus of claim 3, wherein said laser source is a continuous wave laser.
5. (original): The apparatus of claim 3, wherein said laser source is a pulsed laser.
6. (original): The apparatus of claim 1, further comprising a magnetic field source which is operable to apply a magnetic field about said target fiber.

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7. (original): The apparatus of claim 1, wherein said laser source is disposed at least 2 meters away from said target fiber.

8. (original): The apparatus of claim 6, wherein said laser source is a continuous wave laser emitting light in the UV range between 300 and 400 nm.

9. (original): The apparatus of claim 1 further comprising a second lens disposed between said first lens and said concave optical element.

10. (original): The apparatus of claim 9, wherein said second lens comprises a cylindrical lens.

11. (original): The apparatus of claim 10, wherein said laser source is disposed at least 2 meters away from said target fiber.

12. (currently amended): A method of photocuring a coating on an optical fiber, comprising:

expanding a laser beam to produce an expanded diameter laser beam;

focusing the expanded diameter laser beam to a strip of light having a diameter that is

larger than a diameter of the fiber onto a front side of the fiber to cure the fiber;

reflecting the laser beam strip of light to a rear side of the fiber.

13. (original): The method according to claim 12, further comprising: applying a magnetic field around the fiber.

14. (original): The method according to claim 12, wherein the laser beam continuously outputs light in a visible portion of electromagnetic spectrum.

15. (original): The method according to claim 12, wherein the laser outputs pulses of visible light.

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16. (original): The method according to claim 12, wherein said laser beam emits in the range of 300-400 nm.

17. (original): The method according to claim 12, wherein said laser beam emits radiation in the range of 400-800 nm.

18. (original): The method according to claim 12, wherein a source of said laser beam is disposed at least 2 meters away from the fiber.

19. (original): The apparatus of claim 1, wherein the laser source outputs radiation in a UV radiation range.

20. (original): The apparatus of claim 3, wherein the laser source outputs radiation in a range of 400-800 nm.

21. (new): The apparatus of claim 1, further comprising the target fiber having the coating disposed thereon.

22. (new): The apparatus of claim 1, wherein the concave optical element comprises a half cylinder mirror.

23. (new): The method of claim 12, wherein reflecting the laser beam to the rear side of the fiber includes reflecting the laser beam with a half cylinder mirror.